

WHAT IS CLAIMED

1 1. For a digital television packet stream having a plurality of different types of
2 tables, a method to determine issuance intervals for like types of said tables,
3 respectively, that do not all have fixed issuance intervals set by a governing
4 standard, the method comprising:

5 setting issuance intervals for like ones of the non-governed tables,
6 respectively, to be non-uniform.

1 2. The method of claim 1, wherein each of the non-uniform issuance intervals is
2 determined as a function of at least one of an amount of time in the future to which
3 the table corresponds and a degree of probable interest to a viewer.

1 3. The method of claim 2, wherein said issuance intervals are weighted so that
2 an issuance interval for a table corresponding to a time nearer the present is smaller
3 than an issuance interval corresponding to a time further in the future.

1 4. The method of claim 1, wherein each issuance interval between any two
2 instances of an i^{th} table is determined according to the following equation:

3
4
$$\text{interval}(i^{\text{th}} \text{ table}) = \text{root_time} + (\text{increment_time}) * i,$$

5

6 wherein $\text{interval}(i^{\text{th}} \text{ table})$ is the interval between any two instances of the i^{th} table,
7 root_time is a predetermined interval for the table corresponding most closely in time
8 to the present, increment_time is a non-zero scalar and i is a non-zero integer.

5. The method of claim 1, wherein said tables are at least one of extended text tables (ETTs) or extended information tables (EITs) defined within the program and system information protocol (PSIP).

6. A program and system information protocol (PSIP) generator to generate tables for a digital television system packet stream, the generator comprising:

an interface to receive at least one issuance parameter for like tables that do not all have an issue interval assigned by a governing standard; and

a non-uniform interval calculation unit to determine non-uniform issuance intervals for unassigned-interval-ones of said tables based upon said at least one issuance parameter.

7. The PSIP generator of claim 6, wherein each of the non-uniform issuance intervals is determined as a function of at least one of an amount of time in the future to which the table corresponds and a degree of probable interest to a viewer.

8. The PSIP generator of claim 7, wherein said issuance intervals are weighted so that an issuance interval for a table corresponding to a time near the present is smaller than an issuance interval corresponding to a time further in the future.

9. The PSIP generator of claim 6, wherein each issuance interval between any two instances of an i^{th} table is determined according to the following equation:

$$\text{interval}(i^{\text{th}} \text{ table}) = \text{root_time} + (\text{increment_time}) * i,$$

wherein $\text{interval}(i^{\text{th}} \text{ table})$ is the interval between any two instances of the i^{th} table, root_time is a predetermined interval for the table corresponding most closely in time to the present, increment_time is a non-zero scalar and i is a non-zero integer, and

9 wherein said at least one issuance parameter is at least one of said root_time
10 and said increment_time.

1 10. The PSIP generator of claim 6, wherein said tables are at least one of
2 extended text tables (ETTs) or extended information tables (EITs).

1 11. The PSIP generator of claim 6, wherein said PSIP generator is embodied in
2 the form of a processor running software.

1 12. The PSIP generator of claim 6, wherein said software is written in the
2 computer language Java.

1 13. A processor-readable article of manufacture having embodied thereon
2 software comprising a plurality of code segments to perform the method of any one
3 of claim 1, respectively.

1 14. A processor-readable article of manufacture having embodied thereon
2 software comprising a plurality of code segments to cause a processor to perform
3 the functional aspects of the program and system information protocol (PSIP)
4 generator of claim 6.